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Summary of Comments and Response to Comments on the Proposed Amendments to the Regulation

310 CMR 60.02:

Regulations for the Enhanced Motor Vehicle Inspection and Maintenance Program (IM)

Regulatory Authority: Massachusetts General Laws, Chapter 111,

Sections 142A through 142M

August 2015

RESPONSE TO PUBLIC COMMENTS ON 310 CMR 60.02: REGULATIONS FOR THE ENHANCED MOTOR VEHICLE INSPECTION AND MAINTENANCE PROGRAM

The Massachusetts Department of Environmental Protection (MassDEP) has proposed amendments to the Massachusetts Motor Vehicle Emissions Inspection and Maintenance Program Regulation, 310 CMR 60.02 to:

1. Implement the kit vehicle requirements of chapter 311 of the acts of 2010, an Act Relative to the Registration and Inspection of Street Rods and Custom Vehicles;
2. Increase the flexibility for becoming a Registered Repairer for diesel vehicles by recognizing the new A9 (Light Vehicle Diesel Engines) certification issued by the Institute for Automotive Service Excellence (ASE); and
3. Delete sections effective prior to October 1, 2008, which were necessary for the transition to new testing requirements and are no longer necessary.

Two public hearings were held on October 28 and October 29, 2013 to receive public comments regarding the proposed amendments. The public comment period closed on November 13, 2013.

The only public comments received were submitted by the Specialty Equipment Market Association (SEMA). Following are the issues raised by the SEMA comments, which were considered by MassDEP, and MassDEP's responses:

SEMA Comment 1:

"The current proposal retains regulatory language requiring kit vehicles to undergo an On Board Diagnostic (OBD) test if the engine used in the vehicle is of a model year requiring an OBD test and for such a vehicle to be subject "to annual OBD testing requirements for the model year of the certified configuration installed in the kit vehicle." SEMA requests that this language be amended to include the language added to the statute in 2010, which provides that such a vehicle "shall be subject to an onboard diagnostic system emissions test applicable to the certified configuration, including any exclusions or exemptions otherwise granted to that certified configuration." Act of Aug. 19, 2010, No. 311, § 3, 2010 Mass. Acts 311 (codified at Mass. Gen. Laws ch. 111, § 142M(b) (2013)) (emphasis added)."

Response:

The final regulation includes the requested language.

SEMA Comment 2:

"The amended regulations should take into account the technical realities surrounding the OBD testing of kit vehicles. Pursuant to the statutory provision granting discretion to the Department to exempt classes of vehicles that present prohibitive inspection problems or are inappropriate for inspection, the Department should modify inspection procedures for kit vehicles given the technical limitations surrounding the transplant of an engine into a kit vehicle. Without amending the current regulatory scheme to take into account these actualities, it would be

impossible for the legislative directive providing for the titling, registration, and operation of kit vehicles to be properly put into effect.

"The technical constraints of testing kit vehicles should be acknowledged and an exemption indicated in the regulation by amending 310 CMR 60.02(12) ("Emissions Inspection Standards") to insert a new subsection labeled and titled as follows: "(e) Kit Vehicle On-Board Diagnostics Test." This subsection should include an exemption for kit vehicles from certain aspects of on-board diagnostics that utilize OBD II computer testing. There are myriad technical complications associated with the interconnectivity of OBD II monitored components in kit vehicles as many components in an OBD II system are not functionally transferable. SEMA recommends that when a kit vehicle is required to undergo an OBD inspection it should be inspected under OBD I requirements, utilize a "sealed" fuel system, and be equipped with all oxygen sensors, evaporative control canisters and catalytic converters."

Response:

The federal Clean Air Act and related EPA regulations require all new vehicles to meet emission standards applicable at the time of vehicle construction. EPA's kit car policy provides an alternative for kit cars: the drivetrain and vehicle emission controls of a certified configuration can be relocated to the kit car. The emissions that were assumed for the donor vehicle are now assumed for the kit car. Because a donor vehicle is retired and its drivetrain relocated to the kit car, the construction of the kit car does not result in the construction of a nonconforming vehicle.

The regulations give kit car constructors three options for meeting emission standards. Under each option, the constructor needs to identify the certified configuration being installed in the kit car. It is this certified configuration that determines the model year of the engine that is permitted to be installed.

Under any of the three options, it is possible that a kit car constructor could choose to install a certified configuration that requires periodic OBD emissions testing (currently required annually in Massachusetts until the vehicle is 15 years old). For emissions testing purposes, the model year of the certified configuration is the model year to be used for determining whether the OBD emissions test is required, and when the vehicle becomes exempt from the OBD emissions test.

MassDEP understands that there may be complications associated with installing an OBDII compliant drive train in a kit car. If the kit car constructor has concerns regarding whether an OBDII certified configuration can be properly installed in the kit car, the constructor has the option of installing a non-OBDII certified configuration to meet emissions requirements. This prevents OBDII from being a barrier to the titling, registration and operation of kit cars. It also prevents Massachusetts from establishing motor vehicle emission standards separate from federal or California requirements, a prohibited act under federal law. No changes were made to the regulation in response to this comment.

SEMA Comment 3:

"Emissions inspection exemptions in Massachusetts law are also available to implement an exemption when the California Air Resources Board (CARB) does not require that a vehicle be equipped with an OBD system. CARB has allowed for modifications to OBD requirements in

certain certified engine packages for which it has issued Executive Orders, such as in Executive Order D-126-30 for the LS3-6.2L V8 E-ROD Kit. The Massachusetts Commissioner of Environmental Protection should adopt conforming modifications to its emissions inspection program to ensure these engines may be installed in kit vehicles and not cause the completed vehicle to fail an OBD II inspection where such an inspection would be required based on engine model year. To ensure conformity with California certification requirements, the current Massachusetts regulation should be amended to provide that kit vehicles subject to emissions inspections shall not fail an inspection on the basis of having used engines or emissions-related automotive parts that have been issued Executive Orders from the California Air Resources Board."

Response:

CARB issues executive orders for aftermarket products when it has determined that the installation of these products will not adversely affect vehicle emissions. These executive orders constitute an exemption from anti-tampering requirements for the aftermarket product. The CARB executive orders are also acceptable to the Environmental Protection Agency. Because the product is acceptable to CARB and EPA, it is acceptable to MassDEP without the need of additional regulatory certifications or approvals from Massachusetts. This includes the installation of E-ROD engine replacement kits, as approved in CARB Executive Orders D-126-30, D-126-31, and D-126-32.

However, E-ROD kits are only certified as replacements for existing engines in certain pre-1996 vehicles. To install an E-ROD kit in a newly constructed kit car for registration in Massachusetts, the kit car constructor would need to retire a qualifying pre-1996 vehicle, indicate that the E-ROD kit is being used as a replacement engine for that vehicle and is the certified configuration being installed in the kit car. The OBD system in an E-ROD kit, as certified by CARB, is acceptable to Massachusetts because of the anti-tampering approval issued by CARB. No changes were made to the regulation.

SEMA Comment 4:

"In Part II of the background and technical support document, the second paragraph regarding kit vehicles cites the EPA's requirement for installing the drive train from an existing donor vehicle, whereby the vehicle owner will rely on the kit car meeting the emissions levels of the donor vehicle. It is unclear whether the Department intends that the kit car's emissions levels be consistent with the donor vehicle as originally certified by the EPA when the vehicle was first manufactured or those imposed during annual I/M testing at the state level. It is also unclear what the Department deems to constitute the "drivetrain" from a donor vehicle. Accordingly, SEMA requests the Department clarify its proposal to confirm that kit cars with engines from donor vehicles shall meet emissions standards in place for the I/M testing required by the Commonwealth of Massachusetts for that donor vehicle and define "drivetrain." Components that typically satisfy I/M requirements include catalytic converters, exhaust gas recirculation (EGR) equipment, oxygen sensors, evaporative control canisters and a sealed fuel system."

Response:

In response to the first part of the comment, regarding emissions from the assembled kit car, the second paragraph of Part II of the background and technical support document discusses the EPA kit car policy's provisions regarding the use of a donor vehicle to meet emission standards for a newly constructed kit car, in lieu of meeting new vehicle emission standards in effect at the time the kit car is completed. This discussion is not related to any emissions measurements that would be used by Massachusetts. This discussion is related to the transfer of a donor vehicle's certified configuration to a kit car.

Massachusetts would verify that this has been done correctly through the Kit Vehicle Visual Test [see 310 CMR 60.02 (12)(c)]. The visual test will verify that all of the emissions equipment that was in the donor vehicle's certified configuration is properly installed. The visual test provisions also require that if the donor vehicle's certified configuration is a model year that is subject to the OBD test, then the kit car would also be subject to the OBD test.

A kit car constructor may also opt to retire a vehicle and designate a qualifying alternative certified configuration other than the certified configuration of the retired vehicle. In this case, the alternative certified configuration would be used to verify compliance with emission requirements.

In response to the second part of the comment, regarding what constitutes a drivetrain, the drivetrain for any certified configuration is determined during the emissions certification process by the approving agency (EPA or CARB). Because what constitutes a certified configuration varies over the history of automotive emission control requirements, Massachusetts will rely on the drivetrain certified by CARB or EPA for any vehicle and will not attempt to replicate this definition for all possible vehicle model years, makes, models, and vehicle options. No changes were made to the regulation in response to this comment.

SEMA Comment 5:

"In the third paragraph of Part II, it is stated that EPA requires *all* of the donor vehicle's "emissions-related" systems and components be installed in the newly constructed kit vehicle. While the installation of the donor vehicle's oxygen sensors, catalytic converters, and evaporative control canisters is entirely achievable, the over-inclusiveness of and failure to define the phrase "all of the donor vehicle's emissions-related systems and components" raises questions on what this provision is actually requiring. For example, some components in OBD II systems, such as evaporative emissions control system's diagnostics tables in the ECU, may not be functionally transferable. SEMA recommends that the requirement be altered to allow kit vehicles to utilize a "sealed" fuel system (required in OBD I inspections), all oxygen sensors, evaporative control canisters and catalytic converters in order to pass I/M standards."

Response:

EPA's kit car policy allows a kit car constructor to transfer a certified configuration from a donor vehicle to a new kit car, in lieu of meeting new vehicle standards applicable at the time the kit car is constructed. To satisfy this requirement, all elements of the certified configuration must be installed in the kit car.

SEMA's request for Massachusetts to approve an emissions configuration other than a configuration approved by EPA or CARB constitutes a request for a Massachusetts-specific configuration, which is prohibited under federal law. No change has been made to the regulation.

SEMA Comment 6:

"In Part V of the background and technical support document, the fourth paragraph dealing with air quality impacts references a novel method for kit vehicles to pass the required "kit vehicle visual test" when a new engine has been installed in the vehicle. At section 310 CMR 60.02(12)(c)(1)(B), the Department is proposing that several conditions be met in order to use an entirely new engine that is not permitted by another new section, 310 CMR 60.02(12)(c)(1)(C), which permits a new engine of a model year within one year of the kit vehicle's first registration date so long as it is certified by the California Air Resources Board. The conditions set forth in 310 CMR 60.02(12)(c)(1)(B) include retiring a passenger car or light duty truck that has been registered in Massachusetts for at least one year within the five years preceding the first registration of the kit vehicle that is of the same fuel type and same model year as the engine used in the kit vehicle or older, and the retired vehicle must be the same size or larger in terms of "nominal displacement," which is based on the number of cylinders in each. It is unclear to us the rationale or authority for these requirements as they are not specified in any part of the new law as included in the Act of Aug. 19, 2010 at Chapter 311. Clarification on the basis for this portion of the proposal would be appreciated".

Response:

The Department offers the following clarifications. Prior to the proposed amendments, the sole option for newly constructed kit cars to meet emissions requirements was through EPA's kit car policy. The EPA policy requires that the certified configuration from a donor vehicle be relocated to the kit car to meet emissions requirements, in lieu of requiring the kit car to meet new vehicle emission standards in effect at the time the kit car was constructed.

During discussions with enthusiasts and legislators while developing the Act Relative To The Registration And Inspection Of Street Rods And Custom Vehicles (Acts of 2010, Chapter 311), MassDEP was asked to explore alternatives to the EPA policy that would make it easier for kit vehicle constructors to meet emissions requirements while still preserving air quality gains.

As a result of its review of the industry, MassDEP considered the following:

- General Motors announced it would be making new vehicle certified configurations available to the enthusiast market;
- The concept of mobile source emission reduction credits had matured; and
- The enthusiast community indicated that newer engines were manufactured with improved materials and tolerances, making them preferable to used engines. This would make the engines more durable, less likely to develop lubricant seal leaks, and less likely to experience blowby issues.

In response, MassDEP expanded the EPA kit car policy's concept to allow the retirement of an existing vehicle, and the application of emissions requirements to be the same as a similar vehicle of the same vintage. This would allow a kit car constructor to retire a pre-emissions controlled vehicle, which MassDEP considers to be any pre-1974 vehicle, and install a similar new replacement engine in the kit car, instead of being required to use the actual block that was removed from the donor vehicle.

When considering what vehicles would be eligible to provide transferable emission rights to kit cars, MassDEP had to consider the location of the emissions from the retired vehicles and how to enforce the retirement requirement for the vehicle being used as the donor for the kit car. Because the kit cars are destined for registration and use in Massachusetts, emission reductions from the retirement of Massachusetts vehicles ensured that the benefit from vehicle retirement was related to air quality in Massachusetts.

Because the retirement of vehicles for scrappage in Massachusetts is already regulated by the Massachusetts Department of Transportation's Registry of Motor Vehicles division, MassDEP was able to use an existing regulatory framework regarding vehicle retirement and scrappage.

When considering how long a retired vehicle should be permitted to be used to create transferable emissions for a kit car, MassDEP heeded input from kit car enthusiasts indicating that most kit car builds are completed somewhere between one and three years, although some builds have been known to take longer if complex, or if personal or family issues complicate completion of the build. For this reason, MassDEP considered five years to be adequate for completion of completing the build. This would give the kit car constructors adequate time during the course of their build to locate a donor vehicle for retirement and scrappage.

When considering what vehicles should be allowed to serve as donors for the transfer of emissions, MassDEP considered the condition of the vehicle. Vehicles that had been recently registered were considered potential candidates for continued operation.

A vehicle that had been in an accident and its registration and insurance cancelled to save money while awaiting repairs might be returned to onroad operation, or it might be purchased in its damage condition and serve as a donor vehicle for a kit car. Since a vehicle recently involved in an accident makes a good candidate for a kit car donor vehicle, MassDEP did not want to exclude these vehicles from consideration. For this reason, MassDEP opted to allow vehicles with recently lapsed registrations to be considered, instead of allowing only currently registered, or registered and inspected vehicles to be eligible for emissions transfer.

Because the retirement and scrappage of a vehicle created transferable emissions for use in a kit car, MassDEP was concerned that the replacement engine used in the kit car would have emissions similar to the retired vehicle. Absent any other mechanism, engine size was selected. If the engine in the retired vehicle and the new replacement engine to be used in the kit car were of the same general size, then the emissions would more likely be similar.

For emissions purposes, the model year of the replacement engine would be considered the same model year as the retired vehicle. This created the desired flexibility because it meant that the engine of a specific donor vehicle did not have to be acquired to power the kit car. For example,

a Chevrolet could be retired and its emissions transferred to a Cobra kit car with a new replacement Ford engine of similar size.

While searching for additional flexibility, MassDEP learned that General Motors was applying to CARB for certification of its initial E-ROD product. Because California requires that any specialty vehicle beyond the 500th to be registered in a year must meet new vehicle emission standards, this was thought to create a market for new vehicle certified configurations.

Since then, the E-ROD line of products has failed to garner CARB approval as a certified new vehicle configuration. However, CARB approved them for use as engine replacement kits for pre-1996 vehicles. As a result, there are no current products available under the proposed regulation's third option, to use an CARB-approved new vehicle certified configuration.

Regarding the vehicle scrappage option for meeting emissions requirements, this alternative should not have any impact different than EPA's kit car policy. In both cases, the emissions from the donor vehicle are transferred to the kit car. With the EPA kit car policy, the drive train is also transferred to the kit car. While the scrappage option requires the VIN be retired and the engine and chassis destroyed, recovery of useful parts is permitted, including the transmission, rear end, body panels, bumpers, etc. In both cases, a vehicle is surrendered so that the kit car may operate without being required to meet the emission standards for the year in which its construction is completed.

SEMA Comment 7:

"SEMA opposes state and national efforts to scrap older vehicles as they threaten to disadvantage consumers by raising the price of used cars and parts, diminishing the availability of affordable transportation and repair parts to low-income drivers. SEMA member businesses, including auto restoration, customization and repair shops will unnecessarily suffer with the loss of older cars, trucks and parts they need to supply and service their customers. The provision will also negatively impact nonprofit organizations that rely on the donation of older vehicles, as the supply of vehicles available for donation will be reduced. Charitable organizations such as Melwood Industries, the Congressionally-chartered Military Order of the Purple Heart, and the Salvation Army rely on used car donations to fund their programs."

Response:

MassDEP does not believe that the regulation unfairly places low-income consumers at a disadvantage by raising the price of used cars and parts. MassDEP has considered that, in comparison to the total number of older vehicles driven in Massachusetts, a very small portion of these cars are used for the purpose of powering a kit car. For instance, the number of kit cars registered in Massachusetts for the years 2012 and 2013 are 34 and 4, respectively. Therefore, the economic impact of these used car and parts sales on the overall supply and price of older cars is negligible, given the great number of older cars still available for purchase and sale.

Moreover, the new regulation does not provide a greater or additional incentive than EPA's existing kit car policy for the sacrifice of an older vehicle. The premise of EPA's kit car policy is that, by transferring the drivetrain of an existing vehicle into a new kit car, the construction of the kit car does not represent the addition of an older vehicle, but the transfer of the older vehicle

into the newer kit car. For example, if the drivetrain from a 1990 Mustang is transferred to a kit car, EPA considers the emissions certification for the 1990 Mustang to be applicable to the new kit car. For emissions purposes, this means the kit car is a 1990 Mustang. Because the EPA policy, which has been in force for nearly 20 years, already allows the retirement of an older vehicle to power a kit car, MassDEP's regulations do not create any additional incentive to do so under state law.